

## ABSTRACT

5 A fuel-cell stack is presented that may include two elementary cells disposed in a facing relationship and which produce electric energy and heat. An internal duct is formed between the elementary cells for cooling fluid circulation. A plurality of thermoelectric modules are in thermal contact with one of the elementary fuel-cells and the cold sink and the modules produce additional electrical energy. Each of the thermoelectric modules comprises a pair of elements made of two materials of dissimilar nature.